

### Weather outlook for Wednesday through Friday

At this time our weather is controlled by a strong high pressure system over Ohio, which has brought cold air to the northeast, and weak onshore flow in our area. In the next day, this high pressure system shifts eastward in response to a strong wave propagating from the west. This will fundamentally change the weather here in the next three days. Model runs are generally in agreement on the timing of this change, though the latest runs appear to be slightly slower than previous runs. Still, the basic forecast remains the same. As the high shifts eastward, we will get strengthening, and more southerly, onshore flow at low levels. Past forecasts have suggested a chance of thunderstorms on Wednesday from this. The Houston office has dropped their thunderstorm probabilities to 0 for Wednesday based on thermodynamic considerations, and looking at most T-storm indicators, they are substantially less favorable than the last time around (November 1 and November 2). The Storm Prediction Center has also failed to include our area in the severe weather region, placing probabilities further north and east ([www.spc.noaa.gov/products](http://www.spc.noaa.gov/products)). This all makes sense, since most of the strong dynamics tomorrow will be north of us. In other words, the synoptic scale lifting from propagating waves needed for thunderstorm initiation (especially given the unimpressive thermodynamic indicators) will be elsewhere. We still can expect a 30% chance of rain tomorrow, more likely for landing than for takeoff. This will take the form of showers.

As the above-mentioned high moves eastward, another high pressure system will drop southward on the lee side of the rockies, bringing with it cold air and a fundamental change in wind direction from Wednesday to Friday. As this change progresses, at first (Wednesday night) rain chances will drop as we get less warm moist air. The Houston office is calling for a 20% chance of showers and thunderstorms Wednesday night. Based on the reasoning in the previous paragraph, I would not be too concerned about this, or any chance that this chance of thunderstorms on Wednesday night could “bleed into” our Wednesday landing time. Then, as the actual cold front approaches on Thursday, rain chances will go up to 30 % again (showers and thunderstorms). The models are backing off on the timing a bit, so that the actual frontal passage will probably not occur until late Thursday. The implications of this shift in timing are merely that Thursday temperatures will get a bit warmer than initially expected – to the lower 70's.

By Friday, temperatures will be 15 degrees colder, with highs only in the 50s. The only concern, a minor one, is that winds will pick up – models are calling for 15 knots from the north. This is about 20 degrees off the runway – not a problem.

The cloud discussion will follow in a separate mailing – just so you get this early. The web address for the Houston forecast products is:  
<http://www.srh.noaa.gov/hgx/forecasts.htm>